Formal and informal surveillance systems: how to build bridges?

Application to the surveillance of HPAI in Vietnam

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The « human » component of the surveillance systems

- **Reports by actors=** key element of the system
- **Farmers** and **private veterinarians** : on the front line of the animal diseases surveillance
- **Low farmers' participation** into preventive control programs or surveillance program becomes an object of study for sociologists or health specialists

Casal et al, Prev Vet Med, 2007

Hefferman et al, Prev Vet.Med 2008,

Palmer et al, European Society for Rural Sociology,2009,

Elbers et al, Rev sci tech Off.Int.Epiz, 2010,

Prete, Sociologie du Travail, 2008

How socio-antropology can contribute to improve surv. systems?

Common levers of the sanitary autorities

Juridical means⇨ reporting = legal duty

Incentive means⇨ financial compensation

Farmer's decision to report or not

Other considerations

Socio-antropology may contribute to **understand the (dys)functioning of a surveillance system**

What is possibly influencing the circulation of sanitary information within an animal health surveillance system?

Farmer's awareness

= "*educative approach*"

(Palmer et al, 2009)

= Science/risk-centered stance

*Is the suspected low level of reporting in Vietnam **still a question of awareness**?*

*What are the **components** of the*

The Government of the S.R. Viet Nam | World Health Organization | Food and Agriculture Organization | United Nations Children's Fund | United Nations Development Programme

Joint United Nations Programme to Fight Highly Pathogenic Avian Influenza (HPAI)

*Will **reporting a suspect case** of*

*a **dishonor**,*

ghboring

behavior?

ng = tool to c

(disease) is

and ha

4,

ltry farmers

ns and the general HPAI control policies?

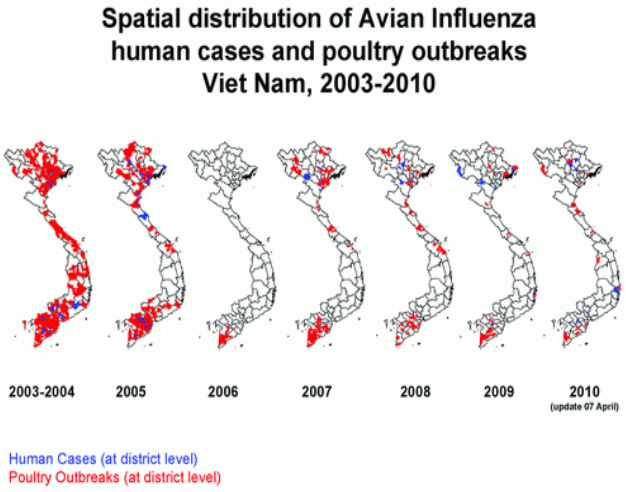
trust and credibility

(Wynne,1992, 1996, 2006

4/ Analytical grid

Application to the Vietnamese context of the surveillance of HPAI

- HPAI = notifiable disease
- Compensation scheme
- Strong central commitment (vaccinatio
- Important international support
- Under-reporting of HPAI suspected



<u>Our objective =</u>

Understand the sanitary information circulation *(content of the information;* ***method****,* ***scope*** *and* ***speed*** *of circulation;* ***actors*** *involved;* ***actions*** *triggered as a result of the information received)*

and the ***economical and social incentives (economical rationality and social norms)*** *for disseminating or withholding*

The study

- Two communities of poultry farmers from 2 communes in the RRD in Vietnam (zone of high risk for H5N1)
- Selection of 2 contrasting situations (previous field works)
- 19 interviews of poultry farmers + commune veterinarians (private veterinarians with a public mission) + veterinary drug sellers
  - check-list
  - Recorded + written recording sheet

An active informal surveillance system does exist

- Sanitary information circulating among farmers, neighbours and traders
- Effect of the HPAI crisis on that circulation
- **Reactions** of farmers when disease reported within the ***farmers'epidemiological territory*** (500m to 3km)
- Information considered more useful than information disseminated by official channels (commune vets, loudspeakers)

Farmer's risk framing depends on the epid[illegible]context

with experience, we have succeeded until now in controlling the extent of the epidemic with outbreaks here and there, so there is no need to inform the district or the province"

	[illegible]ne A
	[illegible] of the routine. [illegible]emic disease
Zoonotic and epizootic [illegible]	Epizootic risk only
Farmers feel helpless, look for assistance throught the formal system	Farmers have a high level of perceived self-efficacy and do not see need to contact official vet
Fear the direct consequences of the disease	Fear the indirect consequences of the disease (ban of transport)

No common object under surveillance

- **Case definition**
  - very variable
  - built on experience of first outbreaks (before vaccination)
  - very cautious attitude of the commune vets
  - Alert for commune A: when it is out of control

Village vet B «When I am sure of the diagnosis, I inform, because we should not talk nonsense »

Village vet A « If we loose 60% of the poultry population in the village within 3-4 months, we do not report to the district, this is not a serious epidemic»

No efficient incentives to report to the formal surv. system

- **Legal**,
- **Economical** (compensation policy)
- or **social/political incentives** to report **to formal system**

  = not effective in commune A

  Farmer 6 « it does not change anything to report to the commune vet or not. If we report, we do not have compensation, so farmers prefer to sell to get some money »
- « Technical incentive » to report for commune B

Social incentives to report to the informal system

- Social incentive to **report to other farmers (informal surv syst.)**

  = effective within farmer's neighbourhood

Farmer 5 « I prefer to inform the other farmers than the commune vet, for the common interest and for them to avoid losses, we should not be selfish »

Farmer 8 *« Critics from neighbors would be inevitable in case of culling if I would report to the commune vet in case of epidemy »*

⇨ **Social norm in commune A**= to report to other farmers but NOT to report to formal system

But no commitment outside of the neighbourhood

The local veterinarians: an interface between the formal and informal systems

- The “association” “village and communal veterinarians” can be defined as a “mediator of the surveillance” Prete (2008):
  - Aware of all significant health events in their village and commune.
  - In commune A: found a compromise between farmers’interest α local technical and political pressures

Limited central power over local governments

- Commune B strictly applies the central policies
- Commune A found a compromise between local economical interest, control of the disease and national policy

⇨ Exemple of the vietnamese political system paradox

"*This is not uncommon that local government interpret central policies any way they like*" (V*u, T., in Avian influenza: science, policy and politics, 2009*)

How to build bridges?

- **Need** an ***epidemiological consensus:***

  ⇨ fill the gap between farmer's and local authorities **experience-based knowledge *versus* central pandemic–based policy**

- Enhance trust into institutions:
  - Test and promote compensation policy
  - Transparency into HPAI control policy: What? How?

- Strengthen credibility and responsibility of the **actors at the interface:**
  - Stronger technical background ⇨ more useful for farmers or village vets
  - Diagnosis tool (Free testing disconnected from notification : Dutch exemple on LPAI)
  - Better use of the available sanitary information ⇨ more rapid actions

- **Accompany farmers in redefining the risk:** eg. risk of long distance transmission

- Dynamic definition of the object under surveillance:

On the interest of the collaboration with social sciences

- As an epidemiologist: an opportunity to change our point of view

- Better capture the complexity of the system of actors involved into surveillance

  ....need a good knowledge of the context

  … or more time

- From standardized technical messages to an phased, adapted α changing surveillance and

Thank you for your attention

Aknowledgments

Gripavi project

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